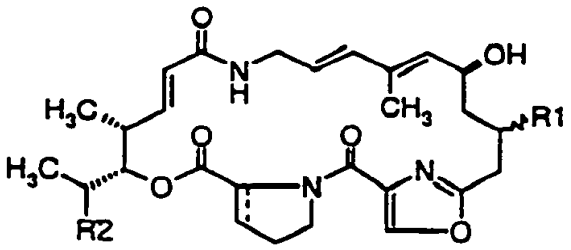
CLAIMS

1. Derivative of group A streptogramins, characterized in that it corresponds to the general formula:



(I)

in which

R_1 is a radical -NR'R'' for which R' is a hydrogen atom or a methyl radical, and R'' is a hydrogen atom or an alkyl, cycloalkyl, allyl, propynyl, benzyl or -OR''' radical, R''' being a hydrogen atom or an alkyl, cycloalkyl, allyl, propynyl or benzyl radical, or R'' represents $-NR_3R_4$, it being possible for R_3 and R_4 to represent a methyl radical, or to form together with the nitrogen atom to which they are attached a saturated or unsaturated 4- or 5-membered heterocycle which may, in addition, contain another heteroatom chosen from nitrogen, oxygen or sulphur,

R_2 is a hydrogen atom or a methyl or ethyl radical, and

the bond --- represents a single bond or a double bond,

and in which unless otherwise stated, the alkyl radicals are straight or branched and contain 1 to 6 carbon atoms; the cycloalkyl radicals contain 3 to 4 carbon atoms; the chain ~~~ at the 16-position means: when R'' is other than -OR''' or $-NR_3R_4$, the R epimer or mixtures of the R and S epimers in which the R epimer is predominant, and when R'' is -OR''' or $-NR_3R_4$, the R and S epimers and mixtures thereof,

as well as its salts.

2. Derivative of group A streptogramins according to claim 1, characterized in that R_1 is a radical -NR'R'' for which R' is a hydrogen atom or a methyl radical, and R'' is a hydrogen atom, an alkyl, cycloalkyl, allyl, propynyl, benzyl or -OR''' radical, R''' being an alkyl radical containing 1 to 6 carbon atoms, an allyl or propynyl radical, or R'' represents $-NR_3R_4$, it being possible for R_3 and R_4 to represent a methyl radical, or to form together with the nitrogen atom to which they are attached a saturated or unsaturated 4- or 5-membered heterocycle which may, in addition, contain another heteroatom chosen from nitrogen, oxygen or sulphur, R_2 is a hydrogen atom or a methyl or ethyl radical, and the bond --- represents a single bond or a double bond, as well as their salts and in which the chain ~~~ at the 16-position means: when R'' is other than -OR''' or $-NR_3R_4$, the R epimer or mixtures of the R and S epimers in which the R epimer

is predominant, and when R'' is -OR''' or $-NR_3R_4$, the R and S epimers and mixtures thereof.

3. Derivative of group A streptogramins according to claim 1 ~~or 2~~, characterized in that R_1 is a radical -NR'R'' for which R' is a hydrogen atom or a methyl radical, and R'' is a hydrogen atom, an alkyl radical containing 1 to 4 carbon atoms, a cycloalkyl, allyl, propynyl, benzyl or -OR''' radical, R''' being an alkyl radical containing 1 to 3 carbon atoms, or an allyl or propynyl radical, or R'' represents $-NR_3R_4$, it being possible for R_3 and R_4 to form together with the nitrogen atom to which they are attached a 5-membered saturated heterocycle, R_2 is a methyl or ethyl radical, and the bond --- represents a single bond or a double bond, as well as their salts and in which the chain ~~~ at the 16-position means: when R'' is other than -OR''' or $-NR_3R_4$, the R epimer or ~~mixtures~~ of the R and S epimers in which the R epimer is predominant, and when R'' is -OR''' or $-NR_3R_4$, the R and S epimers and mixtures thereof.

4. Derivative of group A streptogramins according to claim 1, characterized in that it is (16R)-16-dimethylamino-16-deoxopristinamycin II_A as well as its salts.

5. Derivative of group A streptogramins according to claim 1, characterized in that it is (16R)-16-methoxyamino-16-deoxopristinamycin II_B as well as its salts.

6. Derivative of group A streptogramins according to claim 1, characterized in that it is (16R)-16-ethoxyamino-16-deoxopristinamycin II_B as well as its salts.

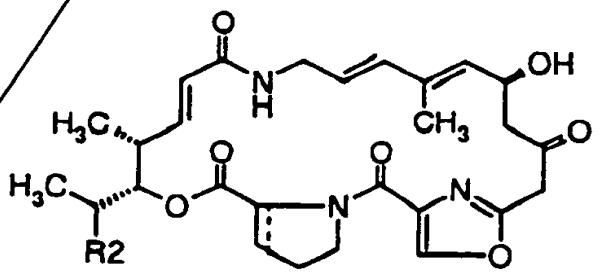
7. Derivative of group A streptogramins according to claim 1, characterized in that it is (16R)-16-allyloxyamino-16-deoxopristinamycin II_B as well as its salts.

8. Derivative of group A streptogramins according to claim 1, characterized in that it is (16R)-16-methoxyamino-16-deoxopristinamycin II_A as well as its salts.

9. Process for preparing a streptogramin derivative according to claim 1, characterized in that an amine of general formula:

$$H_2N\text{-}R'' \qquad (III)$$

in which R'' is as defined above, is reacted with a component of natural pristinamycin of general formula:

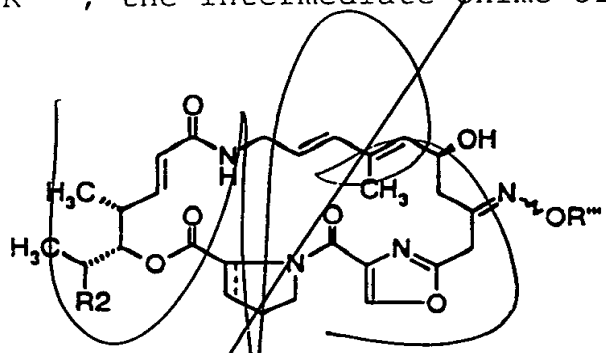


(II)

in which R_2 is as defined in claim 1, and then an agent for reducing the intermediate enamine (or oxime) obtained is caused to react and, when it is desired to obtain a streptogramin derivative according to claim 1

for which R' is a methyl radical, a second reductive amination is carried out by the action of formaldehyde or of a derivative generating formaldehyde in situ, followed by the reduction of the intermediate enamine, the product obtained is optionally converted to a salt, and/or its R epimer is separated.

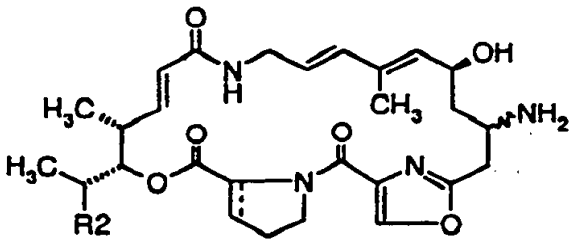
10. Process according to claim 9, characterized in that to prepare a streptogramin derivative according to claim 1 for which R'' is a radical -OR''', the intermediate oxime of general formula:



(IV)

in which R_2 and R''' are as defined in claim 1, is isolated, and then converted by reduction to a streptogramin derivative according to claim 1 for which R' is a hydrogen atom, which may be optionally used in the subsequent reductive amination operation.

11. Process for preparing a streptogramin derivative according to claim 1, characterized in that the ketone corresponding to the desired R'' radical is reacted with the amine-containing derivative of general formula:



(V)

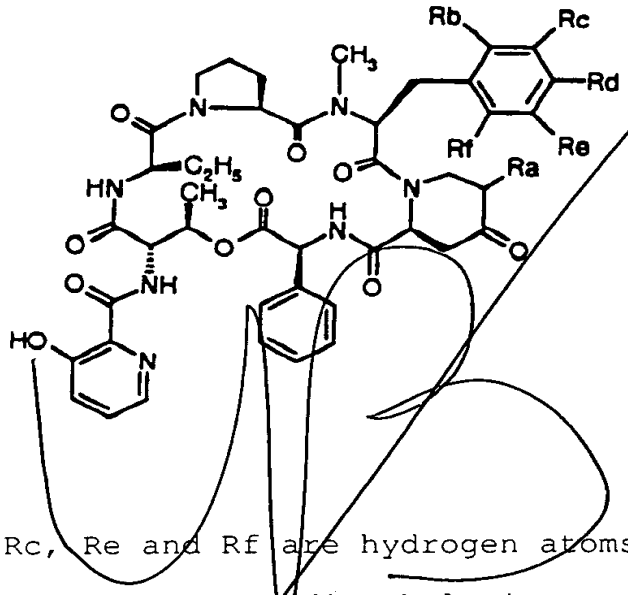
in which R_2 is as defined above, and then when it is desired to obtain a streptogramin derivative according to claim 1, for which R' is a methyl radical, a second reductive amination is carried out, by the action of formaldehyde or of a derivative generating formaldehyde in situ and the intermediate enamine is reduced, and the product obtained is optionally converted to a salt, and/or its R epimer is separated.

12. Combinations characterized in that they comprise a group A streptogramin derivative according to claim 1 and a group B streptogramin derivative.

13. Combinations according to claim 12, characterized in that the group B streptogramin derivative is chosen from natural components or semisynthetic components.

14. Combinations according to claim 12, characterized in that the group B streptogramin derivative is chosen from pristinamycin I_A, pristinamycin I_B, pristinamycin I_C, pristinamycin I_D, pristinamycin I_E, pristinamycin I_F, pristinamycin I_G, virginiamycin S_1, S_3 or S_4, vernamycin B or C or etamycin.

15. Combinations according to claim 12, characterized in that the group B streptogramin derivative is chosen from the streptogramin derivatives of general formula:



(A)

in which,

1. Rb, Rc, Re and Rf are hydrogen atoms, Rd is a hydrogen atom or a dimethylamino radical, and Ra is a radical of structure $-CH_2R'a$ for which R'a is 3-pyrrolidinylthio or 3- or 4-piperidylthio which may be substituted with alkyl, or alkylthio substituted with 1 or 2 hydroxysulphonyl, alkylamino, dialkylamino (itself optionally substituted with mercapto or dialkylamino), or substituted with 1 or 2 optionally substituted piperazine rings, morpholino, thiomorpholino, piperidino, 1-pyrrolidinyl, 2-, 3- or 4-piperidyl or 2- or 3-pyrrolidinyl (which may be substituted with alkyl), or alternatively Ra is a radical of structure =CHR'a for which R'a is

3-pyrrolidinylamino, 3- or 4-piperidylamino, 3-pyrrolidinyloxy, 3- or 4-piperidyloxy, 3-pyrrolidinylthio, 3- or 4-piperidylthio which may be substituted with alkyl, or R'a is alkylamino, alkyloxy or alkylthio substituted with 1 or 2 hydroxysulphonyl, alkylamino, dialkylamino (itself optionally substituted with dialkylamino), or with trialkylammonio, 4- or 5-imidazolyl, or with 1 or 2 optionally substituted piperazine rings, morpholino, thiomorpholino, piperidino, 1-pyrrolidinyl, 2-, 3- or 4-piperidyl or 2- or 3-pyrrolidinyl (which may be substituted with alkyl), or

Ra is a 3- or 4-quinuclidinylthiomethyl radical,

or alternatively

2. Ra is a hydrogen atom and

a) either Rb, Re and Rf are hydrogen atoms, Rd is a radical $-NHCH_3$ or $-N(CH_3)_2$ and Rc is a chlorine or bromine atom, or represents an alkenyl radical containing 3 to 5 carbon atoms [if Rd is $-N(CH_3)_2$],

b) or Rb, Rd, Re and Rf represent a hydrogen atom and Rc is a halogen, or an aminomonoalkyl, aminodialkyl, alkyloxy, trifluoromethyloxy, thioalkyl, C_1 to C_3 alkyl or trihalomethyl radical,

c) or Rb, Rc, Re and Rf represent a hydrogen atom and

Rd is a halogen, or an ethylamino, diethylamino or methylethylamino, alkyloxy or trifluoromethyloxy, thioalkyl, C_1 to C_6 alkyl, aryl or trihalomethyl radical,

d) or Rb, Re and Rf represent a hydrogen atom and Rc is halogen or an aminomonoalkyl or aminodialkyl, alkyloxy or trifluoromethyloxy, thioalkyl or C_1 to C_3 alkyl radical, and Rd is halogen or an amino, aminomonoalkyl or aminodialkyl, alkyloxy or trifluoromethyloxy, thioalkyl, C_1 to C_6 alkyl or trihalomethyl radical,

e) or Rc, Re and Rf represent a hydrogen atom and Rb and Rd represent a methyl radical.

16. Pharmaceutical composition, characterized in that it contains at least one streptogramin derivative according to one of claims 1 to 8, optionally in combination with a group B streptogramin derivative, and/or optionally in combination with any compatible and pharmaceutically acceptable diluent or adjuvant.

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